



LEARNING FROM HISTORY: CULTURAL HERITAGE IN TIMES OF CLIMATE CHANGE

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ABSTRACT: The state of preservation of a cultural heritage object depends on a number of factors (relative humidity, temperature, light, pollutants, etc.) which can be referred to as its “history”. However, only very few objects have a well-known history: This is why concepts like the “proofed fluctuation concept” fail. To allow any prediction about its future, we therefore have to learn more about the f. i. climate history of cultural heritage items and sites. This knowledge is even more important in periods of dramatic climate change.

It is an aim of preventive conservation to provide acceptable conditions for the preservation of movable and immovable cultural heritage objects. These are often housed in historic buildings under legal protection. The “Climate for Culture” project aimed to develop mitigation and adaptation strategies for the preservation of the heritage sites and the works of art they house to counter the impact of climate change. Besides raising temperatures, the accumulation of extreme weather events (strong winds, heavy rain- and snowfalls, flooding), the impact of growing tourism as well as decreasing economical resources contribute to its decay.

The case studies selected for “Climate for Culture” are various types of historic buildings from different periods, located in different climate zones and used in different ways. This contribution deals with the question what can be learnt from the history of cultural heritage sites and how this knowledge can be used to enhance future preservation strategies. To enhance the knowledge about the complex interaction between use, indoor and outdoor climate, technical features and the state of preservation different topics were addressed within the “Climate for Culture” project:

- To provide a structure to collect and evaluate information (questionnaire and database).
- To model and analyse “historic” climate conditions.
- To balance the results from scientific laboratory experiments against real-life practical observations in regard to the state of preservation of objects (Climate for Collections Conference).